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ABSTRACT

The World Bank has been assisting the efforts of developing countries to reform secondary education systems for more than 35 years. During this period, the context and imperatives for education reform have changed considerably due to various factors such as globalization of the world economy and the impact of new technologies. This paper is one of a series which addresses a wide range of topics within secondary education that reflect current challenges. The paper, a country case study, addresses the experiences of Romania in developing secondary education. The paper explores the complexity of secondary education and training systems and the correspondingly difficult choices that the government faces in reforming them. It is divided into the following sections: "Country Context"; "Development of Secondary Education and Training"; "Quality and Learning"; "Equity"; "Management and Institutional Development"; "Innovations"; "Bank Support to the Country"; and "Issues." Annexed are data giving the percentage share of students in secondary education for the countries of Eastern Europe and Central Asia. (BT)

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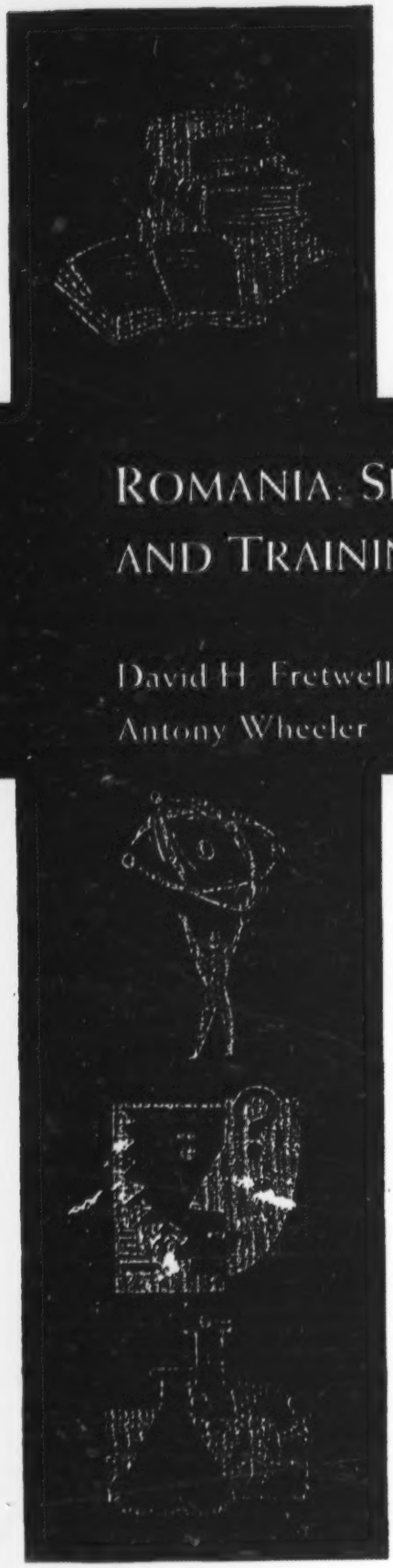

ROMANIA: SECONDARY EDUCATION AND TRAINING

David H. Fretwell
Antony Wheeler

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Secondary Education Series

Romania
Secondary Education and Training

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Foreword

Welcome to the Secondary Education Series of the Human Development Network, Education Group at the World Bank.

The World Bank has been assisting developing countries in their efforts to reform their secondary education systems for more than 35 years. During this period, the context and imperatives for education reform have changed considerably due to various factors such as globalization of the world economy and the impact of new technologies. This new environment requires rethinking the traditional way of providing secondary education and training systems and both industrializing and industrialized countries are grappling how best to prepare their youth to become productive workforce as well as responsible citizens. Thus, this series will address a wide range of topics within secondary education that reflect the challenges that we are facing now.

The publications in this Secondary Education Series might broadly be considered to fall into two categories, though there are clearly overlaps: those papers addressing policy issues and those describing in more detail particular countries' experiences. This paper, "Romania - Secondary Education and Training", is in this second category. The intention behind these country case studies is to expose the complexity of secondary education and training systems and the correspondingly difficult choices that governments face in reforming them. It is only through a clearer understanding of what is happening in particular countries that fruitful discussion and analysis, and further research, can take place. We hope that these case studies stimulate debate. We welcome your comments.

World Bank
Human Development Network
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March 2001

Country Context

Romania achieved universal educational provision in its three main regions as early as the middle of the nineteenth century. The first law on secondary and higher education was passed in 1898, aligning the system to advanced European standards. The unification of all regions in 1918 was facilitated in the education sector because of the previously introduced standardization. During the Communist regime, Romania was able to introduce further educational modernization during the brief periods of opening towards the west. Unfortunately, during the fifteen years before 1989 Romania had perhaps the most totalitarian Communist regime in Eastern Europe, which resulted in a more distorted educational system, particularly at the secondary and higher levels, than in countries in the region. Despite the violent overthrow of the previous leadership in 1989, the first governments after that date initiated only gradual economic reforms, so that the educational reform had to be implemented in a difficult environment, with active reformers pitted against a strongly entrenched bureaucracy largely resistant to change. Thus progress has sometimes been hard to achieve, and has been subject to periodic delays as changes in the pattern of power and influence have impacted on the reform effort. A further but unrelated factor which has caused difficulties for educational provision has been the deterioration of school buildings, due to low maintenance allocations and lack of funds for strengthening those damaged by consecutive earthquakes. Many of these schools became unsafe and in several instances their pupils had to be absorbed elsewhere, which in turn impaired the effectiveness of the over-burdened schools. Only recently has the effort begun to rectify this situation.

Under the Ceaucescu regime, education was totally subordinated to the economic priorities of the government. As a result, only 4% of upper secondary (post-compulsory) enrollments in 1989 were in the general stream (down from 12% in 1980), with the rest in technical or vocational schools which were mostly linked directly to enterprises which were expected to absorb the graduates. However, many technical lycees were established merely by renaming former general lycees, in conformity with prevailing ideology. Nevertheless, during the Communist period there was significant growth of upper secondary enrollments, reflected by the fact that only 25% of the 50-59 age group had upper secondary education in 1996, whereas almost 80% of the 25-29 age group had had some upper secondary education by the same year. Also, only 7% of the relevant age cohort was enrolled in higher education in 1989, mostly in engineering courses. In the later years of the regime educational expe7nditure had fallen to an average of only 2.4% of GDP, which was only enough to do little more than sustain the most crucial recurrent expenditures, with the result that the system was degrading rapidly, despite its impressive expansion on paper. Although, under the provisions of the 1995 Education Law, the Romanian Government is obliged to spend a minimum of 4% of GDP on education, as yet it has never managed to achieve this target, so that the system remains starved of resources.

During the 1990s, there has been a steady redirection of upper secondary enrollments towards the general stream, such that by 1996 32% were in general lycees, 43% in technical lycees, and 25% in shorter vocational courses. The gender distribution shows significant variations between streams, with girls comprising almost two thirds of the general stream, and boys two thirds of the shorter vocational course enrollments, while there is a slight preponderance of boys in the technical lycees. In total, there is virtual parity of male and female enrollments in upper secondary education overall. However, a higher proportion of girls are

enrolled in longer courses which potentially lead to higher education, suggesting that in future the less qualified entrants to the labor force, with a higher likelihood of unemployment, will be more male than female. The total participation in upper secondary education (14-19 age group) in 1996 was 58%, which had shown little change for several years. This divided into participation rates of 78% for 14-16 year olds, but only 40% for 17-19 year olds, reflecting the impact of shorter vocational courses, together with drop-out from the other streams. Although drop-out rates in secondary education are quite low, ranging from 3% in the general stream to 6% in shorter vocational courses, they are higher for boys than for girls. When it is considered that some two fifths of the population do not enter secondary education, it is clear that there is a significant component of unskilled entrants to the labor force, which does not bode well for Romania's future development in a more competitive European environment. The Ministry of Education is aware of the problem and has developed an initiative to enable drop-outs to re-enter education.

Development of Secondary Education and Training

Paradoxically, while Romania embarked on far-reaching reform efforts in both the general and the voc-tech streams of upper secondary education, there was a strong body of conservative educational opinion hostile to reform which repeatedly managed to impede or divert its implementation. Thus the path of reform has not been smooth, and progress has been interrupted by periodic setbacks. As an example of this situation it should be noted that the introduction of a comprehensive new Education Law to reform the Ceaucescu-era system, finally passed in 1995, required four years of intensive political debate which several times almost foundered on such issues as languages of instruction and the specific educational rights of ethnic minorities. This mirrors the partial political reform which is all that Romania had been able to achieve during the early 1990s. More recently, as the benefits of reform efforts have become manifest, there has been growing support for them among the groups concerned.

The conditions under which secondary education has been operating in Romania remain far from ideal. It is normal practice for secondary schools, which are mostly in urban locations, to operate two shifts, due to the lack of resources to open new facilities when required. Conversely, some rural schools face declining enrollments. As noted earlier, the education system has been starved of funds for years, so facilities are usually seriously run-down, and equipment mostly obsolete. The conditions of service of teachers, as with the rest of the public sector, have failed to keep pace with inflation, so that the gap with the private sector has progressively widened. Some teachers' salaries are now as low as $37 per month, only 40% of the national average salary. This has had several adverse consequences. Many teachers with fields of specialization of interest to the private sector, such as foreign languages, have left teaching for more remunerative jobs. Their replacement is difficult because few young graduates are attracted to the by now low-income career of teaching, but there has been retention of older teachers past retirement age, both to offset the wastage but also because of the growing inadequacy of pensions. An aging teaching force is less receptive to the introduction of reforms in teaching methods and content, and the large element composed of mothers with families is also less inclined to respond to new teaching opportunities which may arise elsewhere. The educational system inherited from the Ceaucescu era was an extremely centralized one, with the Ministry of Education issuing regulations to be implemented by county-level inspectorates,

whose role was much more one of ensuring compliance with the rules by schools than promoting qualitative progress and innovation on the part of principals and teachers. The influence of a centralized, top-down approach was also manifest in the issue of standardized curricula from the Ministry, and the provision of all textbooks through a single state publishing house. In effect, a small group of senior officials had what amounted to dictatorial control over all aspects of education, with no source of countervailing power to restrain their actions.

It is therefore all the more commendable that from 1991 onwards, the Romanian political leadership sought to introduce comprehensive reforms covering all types of education and all aspects of the educational process. Because of the internal opposition already mentioned, this effort only began to produce results after 1994, first in basic and general secondary education, and then in vocational and higher education (see Bank Support to the Country below). Reforms in general education have been targeted at a national level on curricula, textbooks, retraining of teachers, assessment and examinations, and the administration, inspection, and financing of schools. On the vocational side 25 pilot schools and 50 demonstration schools have been used to introduce reforms in curricula, teacher-training, the use of occupational standards, and the development of broader social partnerships with potential employers to replace the narrow linkages to specific enterprises which previously characterized the system.

In general secondary education a new curriculum framework was adopted, new curricula based on standards are being progressively introduced in all subjects, and 30% of the curriculum is to be locally rather than nationally determined. Linked to this, competing textbooks based on the new curricula are being prepared by commercial publishers, and schools make their selection from those approved by the Ministry of Education. Parents will have to purchase secondary textbooks, but provision is being made for poor families to receive them free. Teacher re-training programs linked to the new curricula and textbooks are being introduced, and revision of pre-service training is also being undertaken. A major innovation is the creation of a National Assessment and Examinations Board, which is developing standardized assessment instruments and procedures for all levels of education, and also preparing new national examinations to be taken at the end of lower secondary education (grade 8) and at the end of upper secondary (grade 12). It should be noted that all these areas of innovation cover basic as well as upper secondary education and that parallel work is going on in vocational training though the Council for Occupational Standards.

Reform of educational finance and management is also being undertaken with a view to achieving a degree of decentralization and in particular to empower school principals to become active participants and initiators in the process of delivering educational services, instead of being mere recipients and implementers of instructors from above. As an aid to this process the role of the inspectorate is being extensively revised in order to make the inspectors active partners in the process of school improvement, leading by example, instead of instruments of central control. Schools will be responsible for the operation of their own budgets, and have the possibility to obtain supplementary funding from non-budgetary sources or activities. Parents are also encouraged to become active partners in schools, instead of mute observers. To promote all these innovations, large-scale training activities for inspectors and principals are under implementation.

The approach to reform of the voc-tech side of upper secondary education has differed from that followed for the general stream. Under the auspices of a Phare-financed project originally initiated by the World Bank, far-reaching changes have been piloted and then further demonstrated in a group of 75 schools, in the hope and expectation that their success would then lead to wider adoption, in contrast to the nationwide systemic changes which are being progressively introduced in the general stream. (By 1998 the new approach had been adopted in 154 schools.) The basis for this innovation is a system of occupational standards and related assessment instruments developed in the first instance to provide parameters for the development of curricula in the 75 schools (which led to the further development of training standards), but also for the general use of employers wishing to certify the competence of potential and current employees. Instead of the multiplicity of narrow occupational specializations which previously characterized the Romanian voc-tech system, the reform is built around 15 to 20 broad occupational families. These provide the basis for two years of technical specialization at upper secondary which are based on a core curriculum developed for each occupational family, and this is preceded by two years of more general education and training, designed to inculcate broader capacities such as languages, communication skills, and science and computer skills. Provision is also made to develop entrepreneurship along with provision of vocational guidance and counseling. The overall aim is to produce skills and knowledge together with the capacity to develop further self-learning.

Associated with this innovation in content and methods of voc-tech education are retraining of teachers to enable them to effectively supervise self-learning by students, and the provision of the necessary textbooks, equipment, and other teaching materials. A further important element is to promote the establishment of an effective social partnership between each participating training institution and the local community, including a wide range of employers. In this way the partners can become beneficiaries and eventually active supporters of the local training institution.

While this appears so far to have been a successful initiative in far-reaching innovation in voc-tech education, the key question for the future is how far it will be feasible to continue to spread parallel progress to the rest of the voc-tech system, given the extreme resource constraints under which Romanian education continues to operate. Thus far a significant part of the voc-tech system remains unreformed, and hence still turning out narrowly specialized graduates, often in no longer relevant occupations. The forthcoming talks on EU accession may offer a framework for further EU funding of voc-tech education reform.

Quality and Learning

Although the overall picture presented by the Romanian educational system has been one of resource starvation and decline of facilities, accompanied by increasing overcrowding in many urban schools, in the general education stream there have always been a few elite institutions, mostly with a long tradition and occupying buildings which are themselves often classified as historic monuments. These schools have continued to produce the intellectual élite of Romania, and there has been some tendency to divert resources in their direction at the expense of the rest of the system. Entry to these schools is very competitive, and while they may produce very capable graduates, this tends to be prejudicial to the performance of less well-endowed schools,

because of the redirection of scarce resources which it entails. There is a need to get away from the prevailing mind-set, which has sought to channel resources to the best schools to further strengthen them, at the expense of the rest. This is linked to the Communist-era concern to have a nucleus of very well-educated children who could perform outstandingly in international competitions, and hence make successful propaganda for the quality of national education. Instead the priority has to be to raise the quality of the system overall, and enable children in general to become constructive users of knowledge, rather than merely more or less avid consumers of knowledge, as the former curricula and teaching methods tended to make them. Fortunately the systemic approach which has been adopted in the reform of general education addresses this issue. It is less clear so far that the same will be true on the voc-tech side, until such time as resources become available to support further dissemination of the initial innovations.

As in some other countries of the region, the very low pay of teachers, besides impairing their commitment to teaching, has led them to seek supplementary sources of income. It is a growing practice in secondary education for teachers to provide students with additional private lessons, in particular to prepare for the school-leaving examination and university entrance. Besides diverting teachers' attention away from their routine duties, this also has the potential disadvantage that it adversely impacts on students from poorer families, who cannot afford to pay the fees charged for private lessons.

Equity

The problem of élite schools attracting scarce extra resources at the cost of the rest of the system, referred to in the previous section, has an obvious equity implication, besides its potential to constrain the dissemination of quality more broadly. In partial mitigation of this consideration, though, it should be noted that élite schools of the type described are found in all the main urban centers, and not only in Bucharest.

A more serious source of equity problems in Romanian secondary education is the ethnic composition of the society. In general Romania has tried to cater to the needs of its many ethnic minorities, with varying degrees of provision of textbooks in their respective mother tongues, despite the expense of this for the smaller linguistic groups. But one large minority, the Roma or Gypsies, have very limited access to secondary education opportunities, in large part because few of them manage to complete even the compulsory basic education. The Roma may represent as much as 8% of the total population, and they are a significantly higher share of the school-age population, because they have a much younger age-structure than other ethnic groups, or the Romanian majority. Official awareness of this problem is recent, and as part of its endeavor to achieve EU accession, it will be necessary for Romania to address actively the issues of improved Roma access to and performance within the education system.

Although the Education Law provides for the possibility of private secondary education, there is only minimal provision of this so far, less than 1% of enrollments being in private institutions, in contrast to the developments in higher education. Thus growth of private education cannot be considered a source of inequality in Romanian secondary education so far.

Management and Institutional Development

Romania has not gone as far as countries like Hungary in decentralizing the administration of its educational system but is moving forward. The 40-odd judets or counties into which the country is divided continue to be the main administrative units for education, and the judet authorities have full responsibility for the operation of primary and secondary schools in their area, which in some instances amount to several hundred. The main management task is not to change structures but rather to change the mental approach of those staffing the structures, and modify their roles in the process. This is made more difficult because the worsening public sector service conditions have induced more dynamic staff to leave, while making it hard to attract competent replacements. The less enterprising or adaptable staff are those who tend to remain, and they are harder to retrain.

Despite this, the Education Reform Project includes an extensive program of retraining for the inspectors who staff the judet-level education authorities, together with an equally extensive retraining program for school principals. The retraining of inspectors is designed principally to change their role from one of policing adherence to directives by schools to one of being catalysts for the implementation of centrally-conceived reforms at school level, while at the same time stimulating school principals to use their initiative in applying reforms constructively in the local context. Complementary to this effort is the retraining of school principals to make them effective managers of their institutions, able to hire teachers and lead them in the introduction of innovations, manage the school finances and supplement them from non-budgetary sources wherever feasible, and bring parents and the local community into active partnership with the school. These retraining efforts are being progressively implemented in the general education stream, and a parallel attempt has been made in those voc-tech schools directly involved in the Phare-financed project referred to earlier, but it is not yet clear how quickly similar measures can be implemented in the remaining majority of voc-tech schools, although the intention is clearly there.

The above training efforts are substantial and ambitious undertakings, which will take several years to be fully implemented, so it is premature to evaluate their impact. In the meantime, despite dynamic leadership, the Ministry of Education itself also suffers from staff shortages for similar reasons to those mentioned above, worsened by the greater availability of alternative private sector job opportunities in Bucharest, e.g. there are almost no financial or legal staff remaining. Many of the officials left carry multiple responsibilities which they have difficulty in discharging effectively. This situation is exacerbated by budgetary constraints which hamper the Ministry's daily operations, leading to such problems as limited information technology capacity and shortages of office supplies or paper. Thus there is an implicit risk that, to the extent that the previously mentioned retraining efforts at judet and school levels are successful, the Ministry itself will become the weak link in the administrative structure, which in turn suggests the need for a further reform effort focussed on the Ministry itself, in order to improve its operating efficiency. Given the existence of standard public sector terms of service, this may have to be realized through a broader public service reform effort.

Innovations

Despite an operating environment hostile to innovation in many respects, Romania has initiated far-reaching reform measures in the areas of curriculum revision, textbook provision, teacher retraining, and educational assessment and examinations. Similarly wide-ranging initiatives have been undertaken with respect to inspection and school management and financing, and the Phare-financed project represents another significant innovative effort in the voc-tech stream. All of these directions of innovation have been outlined in preceding paragraphs. Romania is so far unique in the ECA Region in the extent to which it has embarked on a comprehensive education reform, relying on international funding and technical assistance, both multilateral and bilateral, to implement innovations.

Bank Support to the Country

The Bank finances three education projects in Romania: the Education Reform Project (1994) dealing with basic and general secondary education (US$50m Bank loan plus limited British funding); the Higher Education and Research Project (1996) dealing with higher education and postgraduate research (US$50m Bank loan plus US$9.6m from EU); and the School Rehabilitation Project (1997) for rebuilding earthquake-damaged schools and creating a systematic school maintenance program (US$70m Bank loan plus US$13.8m from the Council of Europe's Development Bank). Mention should also be made of the Phare-supported program for reform of voc-tech education (ECU25m), since this originated as a component of the Education Reform Project, from which it was taken over. All of these projects also have Government counterpart funds, though their disbursement has repeatedly been delayed by national budgetary constraints. The coverage of secondary education by the Education Reform Project and the Phare program have been outlined in paragraphs 6 to 11 above. The School Rehabilitation Project's coverage includes secondary as well as basic education schools. In addition the Employment Project has initiated reforms in adult training, including establishing a tripartite National Training Council and a network of adult training centers which complement reforms in secondary education and training.

In 1992 a World Bank Country Study entitled "Romania: Human Resources and the Transition to a Market Economy" included a brief overview of the education system and scientific research. In 1995 a "Strategy Note on Higher Education" was issued, which formed a basis for the Higher Education Project. In 1999 an "Education Financial Advisory Note" was prepared, including a cost-effectiveness computer model now being used at both Ministry and judet levels. These are the only activities which could be considered as falling under the rubric of Economic and Sector Work.

Issues

Romania faces many difficulties in implementing its ambitious program of secondary education reforms, but the most serious relate to resource availability and the situation of teachers, which is in some ways a specific aspect of resource availability. More specific issues include ethnic discrimination, and overcrowding in urban schools.

- Resource Availability. Romania has long suffered from under-spending on education, such that the whole system is run-down, and lacks the capacity to renew itself. The Education Law of 1995 stipulated that 4% of GDP should be spent on education (not a high figure by international standards), but as yet the Government has not managed to achieve this, so technically is in default on its legal obligations. Lack of finance impacts adversely on the system in numerous ways – such as motivation of teachers, lack of teaching materials and modern equipment, and degradation of facilities.

- Situation of Teachers. Under the Communist system education was considered a non-productive sector, so teachers were not highly valued, and this was reflected by their low remuneration. Since 1990 their situation has progressively worsened, along with the rest of the public sector, as incomes have stagnated in contrast to the nascent private sector, where they have broadly kept pace with inflation. Hence the morale of teachers is low, and they need second jobs to survive, with the result that commitment to teaching is limited, and receptivity to reform often reduced as a further consequence. Government is making efforts to improve the position of teachers, but the real need is for radical reform of public sector service conditions to attract better-educated young recruits, while removing the "dead wood" which has clung to posts during economic transition, in effect impeding the whole process.

- Urban Overcrowding. The inherited overcrowding in urban schools has not been able to be changed during the last decade. Two-shift operation is the norm, and three shifts not unknown. Given all the other difficulties faced by the education system, this situation further impacts adversely on the quality of instruction. Since many urban schools occupy cramped sites not permitting expansion, there is a need for new school construction as soon as resource availability permits.

- Discrimination. On the whole, access to secondary education appears more equitable than in some other ECA countries, though perhaps more in the negative sense that nearly everybody suffers the same relative deprivation. But one significant exception is the Roma community, which has very limited access to secondary education, stemming from its low participation in lower levels of the system. As this is a growing component of the school-age population, whose deprivation has broader negative social effects in the long run, improved Roma access and retention in education, beginning from the kindergarten level, is an increasing priority.

Annex

Share of Students in Secondary Education in Eastern Europe and Central Asia (percentage of total)

Country	Education Level	1989	1990	1991	1992	1993	1994	1995	1996	1997
Albania	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	31.1	29.4	49.4	63.0	70.9	78.0	79.4	82.1	84.2
	Vocational/Technical	68.9	70.6	50.6	37.0	29.1	22.0	20.6	17.9	15.8
Armenia	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	53.2	54.2	55.8	57.9	63.1	67.3	72.0	71.7	73.7
	Vocational/Technical	46.8	45.8	44.2	42.1	36.9	32.7	28.0	28.3	26.3
Azerbaijan	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	54.2	56.3	57.4	61.0	63.8	66.8	69.7	72.4	76.0
	Vocational/Technical	45.8	43.7	42.6	39.0	36.2	33.2	30.3	27.6	24.0
Belarus	TOTAL	100	100	100	100	100	100	100	100	-
	General secondary	35.0	35.4	35.4	34.9	34.3	36.0	37.1	39.4	-
	Vocational/Technical	65.0	64.6	64.6	65.1	65.7	64.0	62.9	60.6	-
Bosnia-Herzegovina	TOTAL	-	-	-	-	-	-	-	-	-
	General secondary	-	-	-	-	-	-	-	-	-
	Vocational/Technical	-	-	-	-	-	-	-	-	-
Bulgaria	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	39.5	38.7	38.9	40.5	41.6	42.3	42.7	42.6	41.9
	Vocational/Technical	60.5	61.3	61.1	59.5	58.4	57.7	57.3	57.4	58.1
Croatia	TOTAL	-	-	100	100	100	100	100	100	100
	General secondary	-	-	13.0	18.8	23.6	25.3	24.7	24.6	24.7
	Vocational/Technical	-	-	87.0	81.2	76.4	74.7	75.3	75.4	75.3
Czech Republic	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	17.8	18.9	17.7	17.4	15.8	13.1	13.2	14.5	15.2
	Vocational/Technical	82.2	81.1	82.3	82.6	84.2	86.9	86.8	85.5	84.8
Estonia	TOTAL	-	100	-	100	100	100	100	100	-
	General secondary	64.8	49.0	67.5	50.2	52.4	55.0	54.7	53.5	-
	Vocational/Technical	-	51.0	-	49.8	47.6	45.0	45.3	46.5	-
FYR Macedonia	TOTAL	-	-	-	-	-	-	-	-	100
	General secondary	-	-	-	-	-	-	-	-	31.2
	Vocational/Technical	-	-	-	-	-	-	-	-	68.8
Georgia	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	67.6	70.4	70.6	69.4	62.8	63.3	61.7	64.6	63.5
	Vocational/Technical	32.4	29.6	29.4	30.6	37.2	36.7	38.3	35.4	36.5
Hungary	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	23.9	24.0	24.6	25.6	26.1	26.8	27.0	27.1	27.6
	Vocational/Technical	76.1	76.0	75.4	74.4	73.9	73.2	73.0	72.9	72.4
Kazakhstan	TOTAL	100	100	100	100	100	100	100	100	-
	General secondary	42.9	44.8	45.5	44.6	44.9	45.5	45.9	52.5	-
	Vocational/Technical	57.1	55.2	54.5	55.4	55.1	54.5	54.1	47.5	-
Kyrgyz Republic	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	61.7	62.8	62.8	62.3	61.7	62.0	64.0	67.8	71.0
	Vocational/Technical	38.3	37.2	37.2	37.7	38.3	38.0	36.0	32.2	29.0
Latvia	TOTAL	100	100	100	100	100	100	100	100	-
	General secondary	32.0	31.4	31.6	33.6	40.4	44.2	47.2	53.1	-
	Vocational/Technical	68.0	68.6	68.4	66.4	59.6	55.8	52.8	46.9	-
Lithuania	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	36.7	38.6	40.5	46.9	46.1	48.7	49.5	52.9	54.2
	Vocational/Technical	63.3	61.4	59.5	53.1	53.9	51.3	50.5	47.1	45.8
Moldova	TOTAL	-	-	100	100	100	100	100	100	-
	General secondary	-	-	38.8	39.3	41.3	43.2	44.6	46.0	-
	Vocational/Technical	-	-	61.2	60.7	58.7	56.8	55.4	54.0	-

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Poland	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	22.5	23.4	25.2	26.9	28.1	29.2	30.5	31.1	32.4
	Vocational/Technical	77.5	76.6	74.8	73.1	71.9	70.8	69.5	68.9	67.6
Romania	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	3.5	12.8	21.6	26.5	29.0	29.4	29.0	30.0	30.4
	Vocational/Technical	96.5	87.2	78.4	73.5	71.0	70.6	71.0	70.0	69.6
Russian Federation	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	31.3	33.0	32.8	33.1	33.9	36.2	37.1	38.3	39.8
	Vocational/Technical	68.7	67.0	67.2	66.9	66.1	63.8	62.9	61.7	60.2
Slovak Republic	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	18.1	19.2	20.1	20.9	21.7	22.4	23.2	24.1	25.0
	Vocational/Technical	81.9	80.8	79.9	79.1	78.3	77.6	76.8	75.9	75.0
Slovenia	TOTAL	-	-	-	-	100	100	100	100	-
	General secondary	-	-	-	-	24.3	24.4	24.4	24.8	-
	Vocational/Technical	-	-	-	-	75.7	75.6	75.6	75.2	-
Tajikistan	TOTAL	100	100	-	100	-	-	100	-	-
	General secondary	67.3	76.7	80.4	64.8	76.0	77.0	65.6	-	-
	Vocational/Technical	32.7	23.3	-	35.2	-	-	34.4	-	-
Turkmenistan	TOTAL	100	100	100	100	100	100	100	100	100
	General secondary	62.5	63.9	62.9	62.6	64.9	70.7	76.1	69.4	77.1
	Vocational/Technical	37.5	36.1	37.1	37.4	35.1	29.3	23.9	30.6	22.9
Ukraine	TOTAL	-	-	100	100	100	100	100	100	100
	General secondary	-	-	38.3	37.5	37.6	39.9	41.6	43.9	47.6
	Vocational/Technical	-	-	61.7	62.5	62.4	60.1	58.4	56.1	52.4
Uzbekistan	TOTAL	100	100	100	100	100	-	-	-	-
	General secondary	53.7	56.2	56.8	53.7	51.4	-	-	-	-
	Vocational/Technical	46.3	43.8	43.2	46.3	48.6	-	-	-	-
Yugoslav Republic	TOTAL	-	100	100	100	100	100	100	100	-
	General secondary	-	27.1	35.1	44.3	55.4	56.2	53.7	55.7	-
	Vocational/Technical	-	72.9	64.9	55.7	44.6	43.8	46.3	44.3	-

— Not available

Notes: Definition of title - percentage of students enrolled by type of upper secondary education in the total number
enrolled in upper secondary education

Sources: World Bank staff estimates based on data supplied by UNICEF ICDC

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